IN THE CLAIMS

Please amend the claims as follows:

Claim 1 (Currently Amended): A method for transmitting information from an interrogator system to portable objects[[;]], wherein ~~in this method~~ the information is transmitted through radio carrier wave amplitude modulation over several time intervals, called ~~"pulses"~~ pulses, and with positional coding of these pulses, ~~the characteristics of which are as follows~~ comprising:

[[•]] applying ternary amplitude modulation, ~~is used in which the~~ wherein a first amplitude level [[(B)]] is used with a second amplitude level [[(A)]] that is below the first amplitude level, and a third amplitude level [[(C)]] that is above the first amplitude level, [[(B),]] ~~whereby~~ wherein the ternary amplitude modulation either passes from the first amplitude level [[(B)]] to the second amplitude level [[(A)]] ~~(and is then called negative polarity)~~ or from the first amplitude level [[(B)]] to the third amplitude level [[(C)]] ~~(and is then called positive polarity)~~; and

~~• positional coding is obtained by~~ forming two opposite-polarity pulses ~~(I_1 and I_2)~~ in [[the]] a same pattern to provide positional coding, ~~in which the~~ wherein a position concerned is that of [[the]] a second pulse [[(I_2)]] relative to [[the]] a first pulse [[(I_1)]].

Claim 2 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 1, ~~whereby~~ wherein the information is grouped into messages made up of a sequence of patterns and ~~whereby~~ each of said patterns is associated with an information symbol and contains a code time area [[(Z)]] divided into N identical time units, each ~~of T_c~~ time unit of length T_c, where T_c at least equals [[the]] a length of ~~the pulses (I_1)~~ a pulse in any of the N time units in the code time area [[(Z)]].

amended claims

Claim 3 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 2, ~~whereby the~~ wherein a number N of time units [[(N)]] within the code time area [[(Z)]] equals 2^M, where M is an integer[[;]], and the information symbol transmitted by each pattern ~~then consists in~~ comprises a binary word ~~containing~~ including M bits.

Claim 4 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 2, ~~whereby~~ wherein each message is structured in frames, each ~~of which~~ frame is made up of a first pattern called [[the]] a Start Of Frame (SOF) marker ~~comprised~~ comprising:

[[of]] a first time area [[(Z)]] divided into N time units; [[(T_c),]]]

a first pulse [[(I_2)]] placed before ~~this~~ the first time area; and

a second pulse, [[(I_2)]] with the same polarity as the first pulse, [[(I_1)]] ~~and,~~ placed within ~~this~~ the first time area, [[the]] wherein said Start of Frame (SOF) marker~~, which~~ is followed by patterns associated with the ~~message's~~ information symbols of a message.

Claim 5 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 4, ~~whereby~~ wherein the second pulse of the Start Of Frame (SOF) ~~marker's second pulse (I_2)~~ marker is always placed in [[the]] a same time unit in the first time area [[(Z)]].

Claim 6 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 5, ~~whereby~~ wherein the second pulse of the Start Of Frame (SOF) ~~marker's second pulse (I_2)~~ marker is always placed in [[the]] a last time unit in the first time area [[(Z)]].

Claim 7 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 4, ~~whereby~~ the frame also ~~contains~~ comprises a last pattern[[,]] called [[the]] an End Of Frame (EOF) marker, ~~made up of~~ said End Of Frame (EOF) marker includes a second time area

[[(Z)]] with no pulse and a pulse [[(I_1)]] placed before said second time area.

Claim 8 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 4, ~~whereby~~ wherein a first guard time [[(T_{g1})]], [[the]] a duration of which is a multiple [[(K_1)]] of the time unit [[(T_c)]], is placed between the first pulse [[(I_1)]] and the end of the first time area [[(Z)]].

Claim 9 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 8, ~~whereby~~ wherein a second guard time [[(T_{g2})]], [[the]] a duration of which is a multiple [[(K_2)]] of the time unit [[(T_c)]], is placed after the first time area [[(Z)]].

Claim 10 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 4, ~~whereby,~~ wherein ~~in each pattern,~~ the time area [[(Z)]] is followed by a wait time [[(T_a)]] in each pattern.

Claim 11 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 10, ~~whereby the~~ wherein a length of the wait time [[(T_a)]] is modified for different patterns depending on transmission conditions.

Claim 12 (Currently Amended): [[A]] The method ~~in accordance with~~ of claim 10, ~~whereby the~~ wherein a length of the wait time [[(T_a)]] is modified depending on [[the]] a length of the messages that the portable objects retransmit.

Claim 13 (Currently Amended): A method ~~in accordance with~~ as in any one of the ~~above~~ preceding claims, ~~whereby~~ wherein the first pulse [[(I_1)]] is of negative polarity.

Claim 14 (Currently Amended): A method ~~in accordance with any one of the above claims~~ according to one of claims 1-12, ~~whereby the~~ wherein an amplitude modulation index is lower than 50%.

primary claims

CLAIMS

1. A method for transmitting information from an interrogator system to portable objects; in this method the information is transmitted through radio carrier wave amplitude modulation over several time intervals called "pulses" and positional coding of these pulses, the characteristics of which are as follows:

- ternary amplitude modulation is used in which the first amplitude level (B) is used with a second level (A) below the first and a third level (C) above the first (B), whereby the modulation either passes from the first level (B) to the second (A) (and is then called negative polarity) or from the first level (B) to the third (C) (and is then called positive polarity);
- positional coding is obtained by forming two opposite-polarity pulses (I_1 and I_2) in the same pattern, in which the position concerned is that of the second pulse (I_2) relative to the first (I_1).

2. A method in accordance with claim 1, whereby the information is grouped into messages made up of a sequence of patterns and whereby each of said patterns is associated with an information symbol and contains a code time area (Z) divided into N identical time units, each of T_c length where T_c at least equals the length of the pulses (I_1) in any of the N time units in the code time area (Z).

3. A method in accordance with claim 2, whereby the number of time units (N) within the code time area (Z) equals 2^M, where M is an integer; the information symbol

transmitted by each pattern then consists in a binary word containing M bits.

4. A method in accordance with claim 2, whereby each message is structured in frames, each of which is made up of a first pattern called the Start Of Frame (SOF) marker comprised of a time area (Z) divided into N time units (T_c), a first pulse (I_1) placed before this area and a second pulse (I_2) with the same polarity as the first (I_1) and, within this area, the said Start of Frame (SOF) marker, which is followed by patterns associated with the message's information symbols.

5. A method in accordance with claim 4, whereby the Start Of Frame (SOF) marker's second pulse (I_2) is always placed in the same time unit in the time area (Z).

6. A method in accordance with claim 5, whereby the Start Of Frame (SOF) marker's second pulse (I_2) is always placed in the last time unit in the time area (Z).

7. A method in accordance with claim 4, whereby the frame also contains a last pattern, called the End Of Frame (EOF) marker, made up of a time area (Z) with no pulse and a pulse (I_1) placed before said area.

8. A method in accordance with claim 4, whereby a first guard time (T_{g1}), the duration of which is a multiple (K_1) of the time unit (T_c), is placed between the first pulse (I_1) and the end of the time area (Z).

9. A method in accordance with claim 8, whereby a second guard time (T_{g2}), the duration of which is a multiple (K_2) of the time unit (T_c), is placed after the time area (Z).

10. A method in accordance with claim 4, whereby, in each pattern, the time area (Z) is followed by a wait time (T_a).

11. A method in accordance with claim 10, whereby the length of the wait time (T_a) is modified for different patterns depending on transmission conditions.

12. A method in accordance with claim 10, whereby the length of the wait time (T_a) is modified depending on the length of the messages that the portable objects retransmit.

13. A method in accordance with one of the above claims, whereby the first pulse (I_1) is of negative polarity.

14. A method in accordance with any one of the above claims, whereby the amplitude modulation index is lower than 50%.